



FACT SHEET



JNTF FACT SHEET 99-012

Theater Air and Missile Defense (TAMD) Support at the JNTF

JNTF MISSION

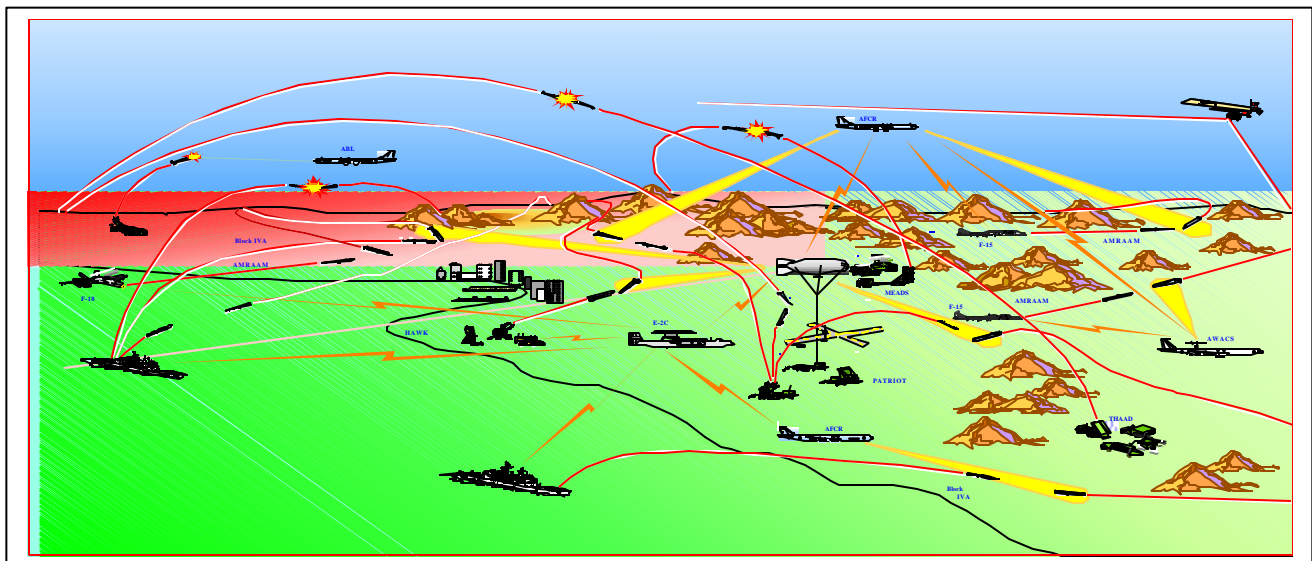
Provide missile defense related analysis, system-level engineering, integration, and test and evaluation support for the development, acquisition and deployment of missile defense systems and architectures. Support the development of Joint and combined missile defense doctrine, requirements, and concept of operations (CONOPS). Support combatant commands by integrating missile defense concepts, space assets exploitation, battle management/command, control, communications, computers, and intelligence (BM/C4I) and by conducting joint and combined simulations, wargames and participating in exercises as directed.

WHERE WE FIT IN

The JNTF contributes to the development, test and deployment of TAMD systems through support to BMDO and JTAMDO. The primary focus is on Joint interoperability issues associated with the TAMD Family of Systems (FoS).

CAPABILITIES SUPPORTING TAMD

- The **Theater Missile Defense System Exerciser (TMDSE)** offers the only hardware-in-the-loop (HWIL) test capability available to integrate the entire TAMD FoS and test interoperability issues that exist between the separately developed TAMD systems. Using Distributed Interactive Simulation protocol data units, TMDSE



TAMD Family of Systems

injects a real-time, common threat scenario into real, geographically distributed tactical sensors and weapon systems. The tactical systems respond in real-time via their respective tactical communication data nets, including TIBS/TDDS and the Joint Data Net (JDN), allowing each individual TMDS system to operate synergistically in a tactically realistic battlefield.

- The **JNTF Exercise Team** provides integration and coordination of JNTF, BMDO and BMD community assets and capabilities into exercise play worldwide. It provides direct simulation support, connectivity, technical support and related services to Commander- in-Chiefs (CINCs), Services, and Joint Chiefs of Staff supported exercises conducting TAMD activities.
- The **Special Program Center (SPC)** is the modeling and simulation center and the threat data repository for BMDO. The SPC's mission is to accurately model credible threat scenarios for the Department of Defense and our Allies. BMDO's Threat Applications Program works closely with the national intelligence agencies to determine the current and future missile threat. These scenarios form the basis for all official BMDO analysis of theater missile defense system capabilities.
- **Wargame 2000 (WG2K)** supports the warfighting CINCs and coalition partners in examining their CONOPS, doctrine, tactics, techniques, procedures and plans for specified air and missile defense command and control scenarios.
- The **Extended Air Defense TestBed (EADTB)** is an analytic simulation for examining theater air and missile defense (TAMD) issues in a Family of Systems (FoS) context. It has been designed to model TAMD elements and architectures from the battery/fire-unit level up to the theater level with a high degree of flexibility in choice of levels of detail and aggregation. It does this through the use of an object-based simulation architecture, Specific System Representations (SSRs) which model individual weapon/sensor/C3 elements, and rule sets which determine how the SSRs interact.

- The JNTF's **Global Command and Control Segment (GCCS)** is divided into two suites. The Segment Development suite contains hardware and software tailored to the needs of software developers and wargamers. This suite is isolated from the real world to quarantine new software under development, test or evaluation. The Operational Suite is a standard GCCS setup providing connectivity via the SIPRNet to operational sites.
- The **Air and Missile Defense Analysis (AMDA)** team at the JNTF applies analytic capabilities and technical and operational expertise to the examination of issues in Theater Air and Missile Defense (TAMD) - including Theater Missile Defense and Cruise Missile Defense. AMDA capabilities include: Project Definition, Event Planning and Analysis, Studies, Verification, Validation and Accreditation (VV&A), and Analysis Tools. The AMDA team has technical and operational expertise in a variety of missile defense relevant disciplines.

STATUS

Executing our assigned TAMD mission.

Decision Inputs From a Level Playing Field

AVAILABILITY

If you would like more information on the capabilities and potential contributions of the JNTF's Theater Air and Missile Defense Support, please contact:

Joint National Test Facility

730 Irwin Avenue
Schriever AFB, CO 80912-7300
Phone (719) 567-9202

jntf.info@jntf.osd.mil
<http://www.jntf.osd.mil>